

What is claimed is:

- 1 1. An apparatus adapted to perform a method for recording and
2 reproducing a digital signal in a track on a recording medium for reproduction at
3 normal and trick play speeds, said method comprising the steps of:
4 a) processing said digital signal to form first and second record
5 signals;
6 b) recording said first record signal in a first part of said track,
7 c) recording said second record signal in a second part of said track
8 smaller than and separate from said first part of said track; and,
9 d) reproducing said first and second record signals from said first
10 and second parts of said track.
- 1 2. The apparatus of claim 1, further comprises a step of:
2 e) decoding said second record signal for display during operation at
3 a trick play speed..
- 1 3. The apparatus of claim 1, further comprises a step of:
2 f) decoding said second record signal for display during operation at
3 a trick play speed..
- 1 4. The apparatus of claim 1, wherein said step a) further comprises a
2 step of:
3 processing an MPEG encoded signal to form said first record signal
4 for reproduction at normal speed and said second record signal for reproduction
5 at said trick play speed.
- 1 5. The apparatus of claim 1, further comprising the step of:
2 processing said digital representative signal to form a trick play
3 signal for recording as said second record signal.
- 1 6. The apparatus of claim 1, further comprising the step of:
2 processing said digital representative signal to form a replay speed
3 specific trick play signal for recording.
- 1 7. The apparatus of claim 1, further comprising the step of:
2 multiplexing said first and second record signals to form a signal for
3 recording in said first part of said helically scanned track.

1 8. An apparatus adapted to perform a method for recording and
2 reproducing an MPEG encoded signal in track on a recording medium for
3 reproduction at normal and trick play speeds, said method comprising the steps
4 of:

5 a) processing said MPEG encoded signal to form first and second
6 record signals;

7 b) multiplexing said first and second record signals to form a signal
8 for recording in a first part of said track; and,

9 c) recording at least one of a speed specific trick play signal and an
10 ATV signal in a second part of said track separate from said first part of said
11 track.

1 9. The apparatus of claim 8, further comprises a step of:
2 reproducing said recorded signals from said first part of said track,
3 said first record signal for use at normal play speed and said second record signal
4 for use at trick play speed .

1 10. The apparatus of claim 8, further comprises a step of:
2 reproducing said recorded signals from said second part of said
3 track, said speed specific trick play speed for trick play operation and said ATV
4 signal for ATV signal display.

1 11. The apparatus of claim 8, wherein signals recorded in said first part
2 of said track represent one of an MPEG signal and a digitally encoded video
3 signal.

1 12. The apparatus of claim 8, wherein signals recorded in said second
2 part of said track represent one of a trick play signal and a digitally encoded
3 audio signal.